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June 2002 Volume III, Issue 6

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Additional information is available online including:

- **Breaking News Features**
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- **Contact Information**

New 'Wright-Site' commander steps up

by 2nd Lt. J. Elaine Hunnicutt, AFRL Public Affairs

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Col. Thomas Thacker, Air Vehicles director, took command of Detachment 1 from Col. Larry Strawser, former Sensors deputy director.

The Detachment 1 or 'Wright Site' command position is an additional responsibility held by an AFRL senior military leader assigned to WPAFB; they're responsible for "taking care" of the military personnel within AFRL, and to ensure order and discipline.

Thacker will also retain his current role as director of the Air Vehicles Directorate.

Strawser served as the 'Wright Site' commander for more than three years and his next assignment is at the Missile Defense Agency in Arlington, Va.

Strawser faced some unique challenges upon his arrival. This was his first assignment to the laboratory, and the detachment had recently reorganized into a single unit only 16 months prior. He relied heavily on the support of his section commanders, Maj. Chris Benedict and Capt. Rocky Favorito, and his first sergeant, Senior Master Sgt. Gary Kersen, but quickly learned and appreciated how vitally important AFRL is to ensuring the technological superiority of our Air Force, according to Strawser.

While Strawser commanded, a major goal was to build a sense of camaraderie among the many organizations within the detachment. "With a lot of help from the other senior military leaders in Detachment 1, we made great strides," said Strawser. One tool developed and used, under his command, to build that camaraderie is the detachment-wide mentoring program established for the junior military members.

Command change continued on page 2

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Maj. Gen. Paul D. Nielsen

Director of Public Affairs
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Change of Command (from page 4)

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"We are faced with significant challenges with many of the detachment personnel identified against deployment billets. We need to ensure these folks are properly trained and equipped for these crucial tasks," said Thacker.

"Plus we have the need to motivate and retain our young officers to keep their skills in the Air Force. All of this while they accomplish their normal duties as world-class researchers in the Air Force Research Laboratory," he continued.

This isn't Thacker's first time as a commander. "I hope to experience the tremendous satisfaction that occurs when your people not only do a great job but also truly enjoy their work," said Thacker.

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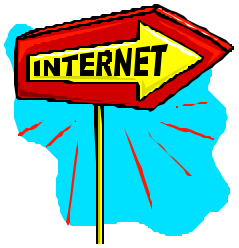

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Col. Mike Leahy, DARPA Program Manager, spoke during a conference call about the accomplishments Unmanned Air Vehicles (UAVs) achieved in Afghanistan, and called the UCAV "the next step in the evolution of UAVs." Leahy lauded the UCAV as the product of "the best this nation has to offer against the challenges presented by the demands of this revolutionary weapons system."

The X-45A flew at NASA's Dryden Flight Research Center on Edwards Air Force Base, Calif. At 7:26 a.m., the flight began and the aircraft subsequently reached an airspeed of 195 knots and altitude of 7,500 feet.

The successful flight demonstrated the characteristics and basic aspects of aircraft operations; specifically, the command and control link between the aircraft and mission-control station.

Later this year, the team will fly a second X-45A, the red bird, leading to multi-aircraft (pack) flight-test demonstrations next year. Eventually, UCAVs will fly in packs, "searching for enemy anti-aircraft missile launchers and working together to destroy them under the supervision of a human operator, who could be located anywhere in the world," Leahy said.

A vital component of the project was teamwork, and this rapport extended beyond the packs in which the UCAVs will one day fly. A strong partnership across government agencies and industry produced the unique set of technologies that led to this historic flight. Air Force Research Laboratory, headquartered at Wright-Patterson Air Force Base, Ohio, was one of the many agencies directly involved in this landmark flight.

AFRL liaison David Lanman, UAV Focus Area Lead, underscored the importance of partnership, emphasizing that, "The flight was a success due to a strong relationship between DARPA, the Air Force, Boeing and NASA."

"We in AFRL are thrilled be a partner in the development of this capability and believe it will transform the way we will fight wars in the future," Lanman added

"The X-45 UCAV demonstrator program is the cornerstone for Boeing's Unmanned Systems organization," said Boeing Program Manager Rich Alldredge. Citing one of the many benefits, Alldredge spoke of UCAV's cost effectiveness, "We expect it not only to be cheaper to acquire, but much cheaper to operate than current generation fighters."

The X-45A Unmanned Combat Air Vehicle

The team's follow-on testing will explore the boundaries of intelligent unmanned combat operations. The summer tests will occur every two to three weeks, phasing into multi-vehicle packages. Beginning in the summer of 2003, into early 2004, demonstrations for weapons delivery will begin. Culminating in 2006, testing will eventually include UCAVs and manned aircraft operating together during an exercise.

The next stage in development is the X-45B. Larger and more capable than its predecessor, the X-45B will incorporate low-observable technologies. The X-45B will be a fieldable prototype aircraft, laying the foundation for an initial operational system towards the end of this decade.

"The vehicles are designed to be able to fly autonomously although it is not an autonomous weapons system," Leahy said. The basic concept for UCAV will be a four- ship pack under the command of a battle manager, who will have the situational awareness to command and control the vehicles. In the 2007-2008 time frame, the UCAV will begin to perform its mission, achieving the preemptive destruction of enemy air defense targets. **@**

EBS PO welcomes Matt Kiehl as its newest team member

by Hang Pham, EBS Program Office

WRIGHT-PATTERSON AIR FORCE BASE, Ohio — The EBS Program Office welcomes its newest member, Capt. Matt Keihl AFRL/XPPP. Keihl joins the EBS PO as the Build Manager of the "Plans and Programs Module with Cross Cutters." Keihl will work closely with the Build Contractor, who will be competitively selected this summer. In addition to forging a strong link to the primary functional users at AFRL Headquarters and technology directorates, having Keihl in the Program Office provides the added dimensions of personal technical skills and proven professional experience.

John Crist, EBS Program Manager stated, "We welcome Capt. Keihl to the program office, and are delighted to have him in a significant role working with the Build Contractor in developing and delivering the first EBS module. As a Level II Certified Acquisition Professional, an alumnus of the Phillips Laboratory at Kirtland AFB, and a veteran space operator, Capt. Keihl brings unique perspectives, talents, and energy to the EBS Program." **@**

AF Secretary Roche reflects on past year, looks to future

Secretary James G. Roche

The following is a message from Secretary of the Air Force James G. Roche to Air Force personnel:

To the men and women of the U.S. Air Force:

One year ago this month, I was sworn in as your 20th secretary of the Air Force and became, on that day, a proud member of a magnificent team of active duty, Guard, Reserve, and civilian airmen. During this time, I've had the deep honor and pleasure to serve alongside Gens. Mike Ryan and John Jumper, and our chief master sergeant of the Air Force, Jim Finch. It is impossible to imagine three more dedicated and professional Air Force leaders.

As I reflect on the year gone by, my first thoughts are with the airmen of our force who made the ultimate sacrifice in the defense of our nation and the freedoms we hold dear. Remember them and their families. Their supreme sacrifice, along with the countless heroes who have gone before them, is why we live free in this great nation.

Each of you should be extremely proud of your achievements and service this past year, from combat operations and homeland defense in the war against international terrorism, to your admirable and noble daily endeavors that guarantee the readiness, health, security and morale of our fighting force. In my travels around our Air Force, I've been impressed and humbled by your ingenuity, commitment and willingness to serve. Thank you for everything you've done to make our Air Force the best the world has ever known.

Of utmost importance to me is our continued focus on warfighting, and honing the edge that enables us to remain expeditionary and responsive to the needs of our nation. The American people trust and admire what you do. They know that America's Air Force provides a full spectrum of air and space capabilities that deliver unprecedented firepower, mobility, awareness and deterrence to our joint forces. And, once again, they've witnessed first hand your truly remarkable performance during operations Enduring Freedom and Noble Eagle.

Through your incredible efforts in this campaign, from deploying troops and building bases to coordinating fires and engaging targets, you've again demonstrated the unrivaled skill of airmen. Consider what we've done for just a moment.

In the first eight months of our war on terrorism, we flew more than 35,000 sorties, employing 78 percent of the total munitions used and damaging or destroying nearly three-quarters of the coalition targets. Our tanker force flew more than 10,000 refueling missions, supporting aircraft from all services.

Our intelligence, surveillance and reconnaissance assets, manned and unmanned, have flown more than 2,000 missions and, when combined with our indispensable space systems, delivered unprecedented battlefield awareness, as well as a vision of the exciting future in this evolving mission area. Our heavy-lifters (cargo aircraft) delivered more than 2.5 million humanitarian daily rations to the people of Afghanistan. Our combat support units have occupied, established, or rebuilt bases throughout Southwest and Central Asia.

And we accomplished all this despite the challenge of waging a combined campaign in a landlocked nation.

Through your efforts, you confirmed to our nation and the world the unmatched value, flexibility and promise of air and space power.

While we've achieved many of our objectives, there remains much work to be done. The fight continues, with many of you going into harm's way daily. Our ongoing missions and your unrelenting sacrifices testify to your commitment to eradicate this threat to our nation and freedom-loving people everywhere. Most important, we need to prepare and resolve ourselves to see this through to the finish, regardless of where the fight takes us.

Many of you are deployed around the world at remote and inhospitable settings, spending extended time away from your families. Many more are scheduled to deploy in the months ahead. Some of you no longer are benefiting from the air and space expeditionary force schedule and are facing more frequent deployments. We've asked many of you to put in long hours well beyond your normal schedules, and we've stretched our force to cover expanded missions in new locations. Many of our people are affected by Stop-Loss.

We're working to mitigate the numbers affected as soon as possible, but until we do, our folks' lives will remain on hold until we complete this campaign. And we have thousands of Air National Guardsmen, Air Force Reservists, and Individual Mobilization Augmentees who are serving for extended periods at great personal cost to their civilian jobs and their family lives. I recognize your sacrifice and commend you for your service.

Our nation needs its Air Force as never before, and your Air Force needs each and every one of you, your talents and your service as never before. Yet, regardless of these challenges, you continue to train, maintain and fight with a level of professionalism unmatched by any force ever assembled.

As I look to the journey ahead, I'm excited at the opportunities we have to serve our nation as we face the challenges posed by our evolving security environment. I look forward to continuing that journey with you.

I remain focused on developing new strategies for air and space power in this new millennium; delivering innovative and effective capabilities to the warfighters; improving Air Force retention, professional education and leadership development; eliminating the inefficiencies in how we do our business; and transforming our acquisition processes to ensure innovation and competitive vibrancy within our defense industrial base.

Most important, I want to ensure we care for our people and their families through these challenging times. Communication, engaged leadership at all levels, and a genuine concern for the value of our people and their daily sacrifices are vital to building and sustaining a motivated and capable force.

SECAF continued on page 6

AFRL sends four overseas for training this summer

by Katherine Gleason, AFRL Public Affairs

WRIGHT-PATTERSON AIR FORCE BASE, Ohio — Can you imagine working on solid rocket propellants in the Netherlands, low frequency radars in Sweden, or modeling and simulation in Germany? This summer, when Capt. Royce Beal, Dr. William Pierson, and Gregg Abate head off to Europe to participate in the Engineer and Scientist Exchange Program (ESEP), they'll be doing just that.

ESEP is a Department of Defense program that promotes international cooperation in military research, development, and acquisition through the exchange of defense professionals. The Air Force currently has ESEP agreements with 14 countries.

Beal, an advanced properties materials chemist with the Materials and Manufacturing Directorate, first became interested in ESEP when a co-worker at Edwards AFB was selected to go to Germany through the program.

"I wanted to apply right away," said Beal, "but I was only a second lieutenant with a bachelor's degree, so I wasn't really qualified yet."

What made Beal's interest in ESEP unique was that he wanted to pursue an exchange opportunity in the Netherlands. Although the Air Force has had an ESEP agreement with the Netherlands since 1978, we have never placed anyone in the Netherlands; although, Dutch nationals have been accepted to United States research facilities.

"There are about three colleges in the U.S. that teach Dutch, and I didn't go to any of them," said Beal. "I did, however, have the opportunity to spend two years in the Netherlands on my LDS mission, and became quite proficient in the language while I was there."

Pierson, who works on the evaluation of automated target recognition systems for the Sensors Directorate, first heard of the program in 1999. His fascination with other cultures led him to apply in 2001.

"I thought the program would be an excellent opportunity to learn a great deal about another culture," said Pierson. "Also, and perhaps more importantly, the work I do at AFRL closely parallels some work being done at FOI [AFRL's Swedish counterpart]. So it seemed a natural situation where the Air Force, FOI and I could all benefit."

While Pierson's ESEP application process went smoothly, Beal's was just the opposite.

"The selection board met while I was TDY, and when I returned, I was told that AFPC (Air Force Personnel Center) indicated to AFOSR (Air Force Office of Scientific Research) that I wasn't eligible for the program and shouldn't have been allowed to apply," said Beal. "The selection board had come and gone, and AFOSR hadn't even looked at my application."

Disappointed, but not defeated, Beal contacted AFPC to determine what had caused him to be declared ineligible. When it turned out that a mistake had been made, and Beal was, in fact, eligible, AFPC contacted AFOSR to find out if there was any way he could still participate in ESEP. Fortunately, only seven of the eight ESEP slots had been filled. AFOSR convened a special selection board, and Beal was finally approved.

During his two-year stint in the Netherlands, Beal will be working at TNO, a Dutch research organization that acts as the principal laboratory for the Ministry of Defense and other ministries. His work there on solid rocket propellants will also aid him in his doctorate dissertation. Beal hopes to someday teach chemistry at the Air Force Academy.

Abate, an aerospace engineer in AFRL's Munitions Directorate, Flight Vehicles Integration branch, will be working at The Ernst Mach Institute (EMI) in Freiburg, Germany. He is being assigned to the Numerical Simulation and Material Characterization Department, where he will work as an active link between the experimental aerodynamics group and the numerical simulation group at EMI. His work will include: experimental testing, numerical modeling, analysis of results, and modeling and simulation.

Pierson will spend his time in Sweden working for FOI. He is currently at training, mastering the language for his trip.

"I'm not entirely certain what projects I'll be working on, but early conversations seem to suggest that I will be working on low frequency (VHF band) synthetic aperture radar (SAR) research," Pierson said.

Pierson earned his bachelor's degree in electrical engineering from the West Virginia Institute of Technology in 1991. He received his master's degree and doctorate degree in electrical engineering from The Ohio State University. His areas of interest include: pattern recognition theory, signal processing, computer vision, and information theory. Pierson was a 2000 co-recipient of the Dr. Samuel M. Burka Memorial Award for the most outstanding technical achievement completed or reported during a year.

Beal earned his Air Force commission in 1995, through the AFROTC program at Utah State University, where he also earned a B.S. in Chemistry. He received a master's degree in Chemistry in 2000 from the University of Delaware, where he is currently working toward his doctorate degree.

Abate received a bachelor's degree in aeronautical engineering from Embry-Riddle Aeronautical University. While working at Eglin Air Force Base, he earned his master's degree and doctorate degree from the University of Florida.

Also selected for ESEP was Capt. Keith Roessig of the Munitions Directorate at Eglin Air Force Base.

Since ESEP's inception, more than 1800 international scientists and engineers have been placed in DoD organizations, and more than 100 USAF military and civilian personnel have been placed overseas. **@**

Women of Color Research Award

1st. Lt. Rojan Quarles

KIRTLAND AIR FORCE BASE, N.M. — 1st Lt. Rojan Quarles was named as a recipient of the 2002 Women of Color in Government & Defense Research Leadership Award. She was honored for being a consistent leader in discovering, developing, and implementing new technologies associated with hyperspectral imaging aboard AFRL's MightySat II.1 satellite.

Quarles will be among 30 women honored for their achievements at the second annual Women of Color in Government and Defense Technology Awards conference to be held in Washington, D.C., in July 2002. **@**

Net Index

Due to the number of submissions we receive, some sections of *news@**afrl*** are available exclusively on-line. The on-line version of the newsletter allows users to view the AFRL corporate calendar, news releases generated by AFRL headquarters, operating instructions, L@b L@urels and Roundups sections.

The L@b L@urels section of the electronic newsletter is dedicated to members of Air Force Research Laboratory who receive awards and honors. The Roundups section of the electronic newsletter keeps Air Force Research laboratory employees informed about contracts AFRL has awarded. Below is an index of articles one can find in each of these on-line sections.

L@b L@urels

- **Korean War veterans receive overdue recognition**
- **AFRL scientist selected for national honor**
- **PR researcher wins Air Force R & D award**
- **Air Vehicles Directorate honors top contributors**
- **Two Rome engineers honored by IEEE**
- **AFRL HQ honors quarterly contributors**
- **Scientist selected for Fellow Award**
- **AFRL engineer wins achievement award**
- **Tech Transfer award goes to Sensors physicist**
- **AFRL scientist receives Good Housekeeping award**

For more on these stories see news@afrl
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SECAF (from page 4)

On that day one year ago, I committed myself to serve in a manner befitting of the great men and women of our Air Force and to serve just as each of you do every day all around the globe — with integrity, selflessness and in the earnest pursuit of excellence. Your entire leadership team — General Jumper; my talented undersecretary, Peter Teets; our vice chief of staff, Gen. Robert "Doc" Foglesong; and myself — is firmly committed to these values.

Your service and sacrifices the past year have been truly magnificent and have earned the justifiable admiration of our nation and the respect of the world. **@**

Signature Exploitation experiment goes favorably

HANSCOM AIR FORCE BASE, Mass. — Air Force Research Laboratory technicians Staff Sgt. Steve Jacquez and Senior Airman Dan O'Shea monitor a hot air balloon burner. As the flame burned, a twin-engine Cessna from AFRL, Rome, N.Y., flew 8,500 feet overhead to see if it could detect the flame through the clouds using infrared images. An experiment of the Signature Exploitation program, the test was deemed successful. (Air Force photo)

To view the full text of these and other articles visit the *news@**afrl*** page on the Internet at http://extra.afrl.af.mil/news/index.htm.

To submit L@b L@urels or Roundups from your directorate, send a query to AFRL Public Affairs at:

Jill.Bohn@afrl.af.mil
or,
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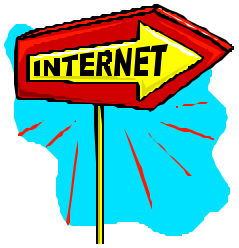

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Later this year, the team will fly a second X-45A, the red bird, leading to multi-aircraft (pack) flight-test demonstrations next year. Eventually, UCAVs will fly in packs, "searching for enemy anti-aircraft missile launchers and working together to destroy them under the supervision of a human operator, who could be located anywhere in the world," Leahy said.

A vital component of the project was teamwork, and this rapport extended beyond the packs in which the UCAVs will one day fly. A strong partnership across government agencies and industry produced the unique set of technologies that led to this historic flight. Air Force Research Laboratory, headquartered at Wright-Patterson Air Force Base, Ohio, was one of the many agencies directly involved in this landmark flight.

AFRL liaison David Lanman, UAV Focus Area Lead, underscored the importance of partnership, emphasizing that, "The flight was a success due to a strong relationship between DARPA, the Air Force, Boeing and NASA."

"We in AFRL are thrilled be a partner in the development of this capability and believe it will transform the way we will fight wars in the future," Lanman added

"The X-45 UCAV demonstrator program is the cornerstone for Boeing's Unmanned Systems organization," said Boeing Program Manager Rich Alldredge. Citing one of the many benefits, Alldredge spoke of UCAV's cost effectiveness, "We expect it not only to be cheaper to acquire, but much cheaper to operate than current generation fighters."

The X-45A Unmanned Combat Air Vehicle

The team's follow-on testing will explore the boundaries of intelligent unmanned combat operations. The summer tests will occur every two to three weeks, phasing into multi-vehicle packages. Beginning in the summer of 2003, into early 2004, demonstrations for weapons delivery will begin. Culminating in 2006, testing will eventually include UCAVs and manned aircraft operating together during an exercise.

The next stage in development is the X-45B. Larger and more capable than its predecessor, the X-45B will incorporate low-observable technologies. The X-45B will be a fieldable prototype aircraft, laying the foundation for an initial operational system towards the end of this decade.

"The vehicles are designed to be able to fly autonomously although it is not an autonomous weapons system," Leahy said. The basic concept for UCAV will be a four- ship pack under the command of a battle manager, who will have the situational awareness to command and control the vehicles. In the 2007-2008 time frame, the UCAV will begin to perform its mission, achieving the preemptive destruction of enemy air defense targets. **@**

EBS PO welcomes Matt Kiehl as its newest team member

by Hang Pham, EBS Program Office

WRIGHT-PATTERSON AIR FORCE BASE, Ohio — The EBS Program Office welcomes its newest member, Capt. Matt Keihl AFRL/XPPP. Keihl joins the EBS PO as the Build Manager of the "Plans and Programs Module with Cross Cutters." Keihl will work closely with the Build Contractor, who will be competitively selected this summer. In addition to forging a strong link to the primary functional users at AFRL Headquarters and technology directorates, having Keihl in the Program Office provides the added dimensions of personal technical skills and proven professional experience.

John Crist, EBS Program Manager stated, "We welcome Capt. Keihl to the program office, and are delighted to have him in a significant role working with the Build Contractor in developing and delivering the first EBS module. As a Level II Certified Acquisition Professional, an alumnus of the Phillips Laboratory at Kirtland AFB, and a veteran space operator, Capt. Keihl brings unique perspectives, talents, and energy to the EBS Program." **@**

AF Secretary Roche reflects on past year, looks to future

Secretary James G. Roche

The following is a message from Secretary of the Air Force James G. Roche to Air Force personnel:

To the men and women of the U.S. Air Force:

One year ago this month, I was sworn in as your 20th secretary of the Air Force and became, on that day, a proud member of a magnificent team of active duty, Guard, Reserve, and civilian airmen. During this time, I've had the deep honor and pleasure to serve alongside Gens. Mike Ryan and John Jumper, and our chief master sergeant of the Air Force, Jim Finch. It is impossible to imagine three more dedicated and professional Air Force leaders.

As I reflect on the year gone by, my first thoughts are with the airmen of our force who made the ultimate sacrifice in the defense of our nation and the freedoms we hold dear. Remember them and their families. Their supreme sacrifice, along with the countless heroes who have gone before them, is why we live free in this great nation.

Each of you should be extremely proud of your achievements and service this past year, from combat operations and homeland defense in the war against international terrorism, to your admirable and noble daily endeavors that guarantee the readiness, health, security and morale of our fighting force. In my travels around our Air Force, I've been impressed and humbled by your ingenuity, commitment and willingness to serve. Thank you for everything you've done to make our Air Force the best the world has ever known.

Of utmost importance to me is our continued focus on warfighting, and honing the edge that enables us to remain expeditionary and responsive to the needs of our nation. The American people trust and admire what you do. They know that America's Air Force provides a full spectrum of air and space capabilities that deliver unprecedented firepower, mobility, awareness and deterrence to our joint forces. And, once again, they've witnessed first hand your truly remarkable performance during operations Enduring Freedom and Noble Eagle.

Through your incredible efforts in this campaign, from deploying troops and building bases to coordinating fires and engaging targets, you've again demonstrated the unrivaled skill of airmen. Consider what we've done for just a moment.

In the first eight months of our war on terrorism, we flew more than 35,000 sorties, employing 78 percent of the total munitions used and damaging or destroying nearly three-quarters of the coalition targets. Our tanker force flew more than 10,000 refueling missions, supporting aircraft from all services.

Our intelligence, surveillance and reconnaissance assets, manned and unmanned, have flown more than 2,000 missions and, when combined with our indispensable space systems, delivered unprecedented battlefield awareness, as well as a vision of the exciting future in this evolving mission area. Our heavy-lifters (cargo aircraft) delivered more than 2.5 million humanitarian daily rations to the people of Afghanistan. Our combat support units have occupied, established, or rebuilt bases throughout Southwest and Central Asia.

And we accomplished all this despite the challenge of waging a combined campaign in a landlocked nation.

Through your efforts, you confirmed to our nation and the world the unmatched value, flexibility and promise of air and space power.

While we've achieved many of our objectives, there remains much work to be done. The fight continues, with many of you going into harm's way daily. Our ongoing missions and your unrelenting sacrifices testify to your commitment to eradicate this threat to our nation and freedom-loving people everywhere. Most important, we need to prepare and resolve ourselves to see this through to the finish, regardless of where the fight takes us.

Many of you are deployed around the world at remote and inhospitable settings, spending extended time away from your families. Many more are scheduled to deploy in the months ahead. Some of you no longer are benefiting from the air and space expeditionary force schedule and are facing more frequent deployments. We've asked many of you to put in long hours well beyond your normal schedules, and we've stretched our force to cover expanded missions in new locations. Many of our people are affected by Stop-Loss.

We're working to mitigate the numbers affected as soon as possible, but until we do, our folks' lives will remain on hold until we complete this campaign. And we have thousands of Air National Guardsmen, Air Force Reservists, and Individual Mobilization Augmentees who are serving for extended periods at great personal cost to their civilian jobs and their family lives. I recognize your sacrifice and commend you for your service.

Our nation needs its Air Force as never before, and your Air Force needs each and every one of you, your talents and your service as never before. Yet, regardless of these challenges, you continue to train, maintain and fight with a level of professionalism unmatched by any force ever assembled.

As I look to the journey ahead, I'm excited at the opportunities we have to serve our nation as we face the challenges posed by our evolving security environment. I look forward to continuing that journey with you.

I remain focused on developing new strategies for air and space power in this new millennium; delivering innovative and effective capabilities to the warfighters; improving Air Force retention, professional education and leadership development; eliminating the inefficiencies in how we do our business; and transforming our acquisition processes to ensure innovation and competitive vibrancy within our defense industrial base.

Most important, I want to ensure we care for our people and their families through these challenging times. Communication, engaged leadership at all levels, and a genuine concern for the value of our people and their daily sacrifices are vital to building and sustaining a motivated and capable force.

SECAF continued on page 6

AFRL sends four overseas for training this summer

by Katherine Gleason, AFRL Public Affairs

WRIGHT-PATTERSON AIR FORCE BASE, Ohio — Can you imagine working on solid rocket propellants in the Netherlands, low frequency radars in Sweden, or modeling and simulation in Germany? This summer, when Capt. Royce Beal, Dr. William Pierson, and Gregg Abate head off to Europe to participate in the Engineer and Scientist Exchange Program (ESEP), they'll be doing just that.

ESEP is a Department of Defense program that promotes international cooperation in military research, development, and acquisition through the exchange of defense professionals. The Air Force currently has ESEP agreements with 14 countries.

Beal, an advanced properties materials chemist with the Materials and Manufacturing Directorate, first became interested in ESEP when a co-worker at Edwards AFB was selected to go to Germany through the program.

"I wanted to apply right away," said Beal, "but I was only a second lieutenant with a bachelor's degree, so I wasn't really qualified yet."

What made Beal's interest in ESEP unique was that he wanted to pursue an exchange opportunity in the Netherlands. Although the Air Force has had an ESEP agreement with the Netherlands since 1978, we have never placed anyone in the Netherlands; although, Dutch nationals have been accepted to United States research facilities.

"There are about three colleges in the U.S. that teach Dutch, and I didn't go to any of them," said Beal. "I did, however, have the opportunity to spend two years in the Netherlands on my LDS mission, and became quite proficient in the language while I was there."

Pierson, who works on the evaluation of automated target recognition systems for the Sensors Directorate, first heard of the program in 1999. His fascination with other cultures led him to apply in 2001.

"I thought the program would be an excellent opportunity to learn a great deal about another culture," said Pierson. "Also, and perhaps more importantly, the work I do at AFRL closely parallels some work being done at FOI [AFRL's Swedish counterpart]. So it seemed a natural situation where the Air Force, FOI and I could all benefit."

While Pierson's ESEP application process went smoothly, Beal's was just the opposite.

"The selection board met while I was TDY, and when I returned, I was told that AFPC (Air Force Personnel Center) indicated to AFOSR (Air Force Office of Scientific Research) that I wasn't eligible for the program and shouldn't have been allowed to apply," said Beal. "The selection board had come and gone, and AFOSR hadn't even looked at my application."

Disappointed, but not defeated, Beal contacted AFPC to determine what had caused him to be declared ineligible. When it turned out that a mistake had been made, and Beal was, in fact, eligible, AFPC contacted AFOSR to find out if there was any way he could still participate in ESEP. Fortunately, only seven of the eight ESEP slots had been filled. AFOSR convened a special selection board, and Beal was finally approved.

During his two-year stint in the Netherlands, Beal will be working at TNO, a Dutch research organization that acts as the principal laboratory for the Ministry of Defense and other ministries. His work there on solid rocket propellants will also aid him in his doctorate dissertation. Beal hopes to someday teach chemistry at the Air Force Academy.

Abate, an aerospace engineer in AFRL's Munitions Directorate, Flight Vehicles Integration branch, will be working at The Ernst Mach Institute (EMI) in Freiburg, Germany. He is being assigned to the Numerical Simulation and Material Characterization Department, where he will work as an active link between the experimental aerodynamics group and the numerical simulation group at EMI. His work will include: experimental testing, numerical modeling, analysis of results, and modeling and simulation.

Pierson will spend his time in Sweden working for FOI. He is currently at training, mastering the language for his trip.

"I'm not entirely certain what projects I'll be working on, but early conversations seem to suggest that I will be working on low frequency (VHF band) synthetic aperture radar (SAR) research," Pierson said.

Pierson earned his bachelor's degree in electrical engineering from the West Virginia Institute of Technology in 1991. He received his master's degree and doctorate degree in electrical engineering from The Ohio State University. His areas of interest include: pattern recognition theory, signal processing, computer vision, and information theory. Pierson was a 2000 co-recipient of the Dr. Samuel M. Burka Memorial Award for the most outstanding technical achievement completed or reported during a year.

Beal earned his Air Force commission in 1995, through the AFROTC program at Utah State University, where he also earned a B.S. in Chemistry. He received a master's degree in Chemistry in 2000 from the University of Delaware, where he is currently working toward his doctorate degree.

Abate received a bachelor's degree in aeronautical engineering from Embry-Riddle Aeronautical University. While working at Eglin Air Force Base, he earned his master's degree and doctorate degree from the University of Florida.

Also selected for ESEP was Capt. Keith Roessig of the Munitions Directorate at Eglin Air Force Base.

Since ESEP's inception, more than 1800 international scientists and engineers have been placed in DoD organizations, and more than 100 USAF military and civilian personnel have been placed overseas. **@**

Women of Color Research Award

1st. Lt. Rojan Quarles

KIRTLAND AIR FORCE BASE, N.M. — 1st Lt. Rojan Quarles was named as a recipient of the 2002 Women of Color in Government & Defense Research Leadership Award. She was honored for being a consistent leader in discovering, developing, and implementing new technologies associated with hyperspectral imaging aboard AFRL's MightySat II.1 satellite.

Quarles will be among 30 women honored for their achievements at the second annual Women of Color in Government and Defense Technology Awards conference to be held in Washington, D.C., in July 2002. **@**

Net Index

Due to the number of submissions we receive, some sections of *news@**afrl*** are available exclusively on-line. The on-line version of the newsletter allows users to view the AFRL corporate calendar, news releases generated by AFRL headquarters, operating instructions, L@b L@urels and Roundups sections.

The L@b L@urels section of the electronic newsletter is dedicated to members of Air Force Research Laboratory who receive awards and honors. The Roundups section of the electronic newsletter keeps Air Force Research laboratory employees informed about contracts AFRL has awarded. Below is an index of articles one can find in each of these on-line sections.

L@b L@urels

- **Korean War veterans receive overdue recognition**
- **AFRL scientist selected for national honor**
- **PR researcher wins Air Force R & D award**
- **Air Vehicles Directorate honors top contributors**
- **Two Rome engineers honored by IEEE**
- **AFRL HQ honors quarterly contributors**
- **Scientist selected for Fellow Award**
- **AFRL engineer wins achievement award**
- **Tech Transfer award goes to Sensors physicist**
- **AFRL scientist receives Good Housekeeping award**

For more on these stories see news@afrl
http://extra.afrl.af.mil/news/index.htm

SECAF (from page 4)

On that day one year ago, I committed myself to serve in a manner befitting of the great men and women of our Air Force and to serve just as each of you do every day all around the globe — with integrity, selflessness and in the earnest pursuit of excellence. Your entire leadership team — General Jumper; my talented undersecretary, Peter Teets; our vice chief of staff, Gen. Robert "Doc" Foglesong; and myself — is firmly committed to these values.

Your service and sacrifices the past year have been truly magnificent and have earned the justifiable admiration of our nation and the respect of the world. **@**

Signature Exploitation experiment goes favorably

HANSCOM AIR FORCE BASE, Mass. — Air Force Research Laboratory technicians Staff Sgt. Steve Jacquez and Senior Airman Dan O'Shea monitor a hot air balloon burner. As the flame burned, a twin-engine Cessna from AFRL, Rome, N.Y., flew 8,500 feet overhead to see if it could detect the flame through the clouds using infrared images. An experiment of the Signature Exploitation program, the test was deemed successful. (Air Force photo)

To view the full text of these and other articles visit the *news@**afrl*** page on the Internet at http://extra.afrl.af.mil/news/index.htm.

To submit L@b L@urels or Roundups from your directorate, send a query to AFRL Public Affairs at:

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